

APPENDIX A**Parties Submitting Comments and Reply Comments in WT Docket No. 00-48**

The following list contains the names of parties filing comments and reply comments in response to the *Further Notice of Proposed Rule Making* in WT Docket No. 00-48:

Comments

Owen Anderson
Kurt Anderson
Dr. Schenk of America LLC
MarITEL, Inc. (Maritel)
National GMDSS Implementation Task Force (The Task Force)
Ronald H. Neuman/Maritime Institute of Technology and Graduate Studies (Neuman)
Passenger Vessel Association (PVA)
Radio Technical Commission for Maritime Services (RTCM)
Recreational Boating Association of Washington (RBAW)
United States Coast Guard (USCG)

Reply Comments

Maritel
RBAW

Parties Submitting Comments and Reply Comments in PR Docket No. 92-257

The following list contains the names of parties filing comments and reply comments in response to the *Fourth Further Notice of Proposed Rule Making* in PR Docket No. 92-257:

Comments

Maritel
USCG

Reply Comments

The Association of Public-Safety Communications Officials-International, Inc. (APCO)
Maritel

APPENDIX B**FINAL RULES**

Chapter I of Title 47 of the Code of Federal Regulations, Parts 13 and 80, is amended as follows:

II. PART 13 -- COMMERCIAL RADIO OPERATORS

1. The authority citation for Part 13 continues to read as follows:

AUTHORITY: Secs. 4, 303, 48 Stat. 1066, 1082, as amended; 47 U.S.C. 154, 303.

2. Section 13.203 is amended by revising paragraph (a)(5), redesignating paragraphs (a)(6) and (a)(7) as paragraphs (a)(7) and (a)(8), and adding a new paragraph (a)(6) to read as follows:

§ 13.203 Examination elements.

(a) * * *

(5) Element 7: GMDSS radio operating practices. 100 questions concerning GMDSS radio operating procedures and practices sufficient to show detailed practical knowledge of the operation of all GMDSS sub-systems and equipment; ability to send and receive correctly by radio telephone and narrow-band direct-printing telegraphy; detailed knowledge of the regulations applying to radio communications, knowledge of the documents relating to charges for radio communications and knowledge of those provisions of the International Convention for the Safety of Life at Sea which relate to radio; sufficient knowledge of English to be able to express oneself satisfactorily both orally and in writing; knowledge of and ability to perform each function listed in § 80.1081; and knowledge covering the requirements set forth in IMO Assembly Resolution on Training for Radio Personnel (GMDSS), Annex 3. The minimum passing score is 75 questions answered correctly.

(6) Element 7R: Restricted GMDSS radio operating practices. 50 questions concerning those GMDSS radio operating procedures and practices that are applicable to ship stations on vessels that sail exclusively in sea area A1, as defined in § 80.1069 of this chapter, sufficient to show detailed practical knowledge of the operation of pertinent GMDSS sub-systems and equipment; ability to send and receive correctly by radio telephone and narrow-band direct-printing telegraphy; detailed knowledge of the regulations governing radio communications within sea area A1, knowledge of the pertinent documents relating to charges for radio communications and knowledge of the pertinent provisions of the International Convention for the Safety of Life at Sea; sufficient knowledge of English to be able to express oneself satisfactorily both orally and in writing; knowledge of and ability to perform each pertinent function listed in § 80.1081; and knowledge covering the pertinent requirements set forth in IMO Assembly Resolution on Training for Radio Personnel (GMDSS), Annex 3. The minimum passing score is 38 questions answered correctly.

III. PART 80 -- STATIONS IN THE MARITIME SERVICES

1. The authority citation for Part 80 continues to read as follows:

AUTHORITY: Secs. 4, 303, 307(e), 309, and 332, 48 Stat. 1066, 1082, as amended; 47 U.S.C. 154, 303, 307(e), 309, and 332, unless otherwise noted. Interpret or apply 48 Stat. 1064-1068, 1081-1105, as amended; 47 U.S.C. 151-155, 301-609; 3 UST 3450, 3 UST 4726, 12 UST 2377.

2. Section 80.15 is amended by revising paragraph (e)(2) to read as follows:

§ 80.15 Eligibility for station license.

* * * * *

(e) * * *

(2) A 406.0-406.1 MHz EPIRB may be used by any ship required by U.S. Coast Guard regulations to carry an EPIRB or by any ship that is equipped with a VHF ship radio station. An INMARSAT-E EPIRB may be used by any ship required by U.S. Coast Guard regulations to carry an EPIRB or by any ship that is equipped with a VHF radio station, provided that the ship is not operating in sea area A4 as defined in § 80.1069(a)(4) of this part.

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3. Section 80.59 is amended by revising paragraph (c)(1)(x) to read as follows:

§ 80.59 Compulsory ship inspections.

* * * * *

(c) * * *

(1) * * *

(x) Type and quantity of radio equipment on board, including:

(A) VHF Radio Installation (indicate if GMDSS approved);

(B) Single Side-Band (SSB) (indicate the band of operation, MF or HF and indicate if GMDSS approved);

(C) Category 1, 406 MHz EPIRB (GMDSS approved);

(D) NAVTEX Receiver (GMDSS approved);

(E) Survival Craft VHF (GMDSS approved);

(F) 9 GHz Radar Transponder (GMDSS approved);

(G) Ship Earth Station;

(H) 2182 Radiotelephone Auto Alarm

(I) Reserve Power Supply (capability); and

(J) Any other equipment.

* * * * *

4. Section 80.95 is amended by revising paragraph (a) to read as follows:

§ 80.95 Message charges.

(a) Except as specified in § 20.15(c) of this chapter with respect to commercial mobile radio service providers, charges must not be made for service of:

* * * * *

5. Section 80.98 is amended to read as follows:

§ 80.98 Radiotelegraph testing procedures.

Stations authorized to use telegraphy may conduct tests on any assigned frequency. Emissions must not cause harmful interference. When radiation is necessary the radiotelegraph testing procedure described in this paragraph must be followed:

(a) The operator must not interfere with transmissions in progress.

(b) The operator must transmit "IE" (two dots, space, one dot) on the test frequency as a warning that test emissions are about to be made.

(c) If any station transmits "AS" (wait), testing must be suspended. When transmission of "IE" is resumed and no response is heard, the test may proceed.

(d) Test signals composed of a series of "VVV" having a duration of not more than ten seconds, followed by the call sign of the testing station will be transmitted. The call sign must be sent clearly at a speed of approximately 10 words per minute. This test transmission must not be repeated until a period of at least one minute has elapsed.

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6. Section 80.102 is amended by revising paragraph (f) to read as follows:

§ 80.102 Radiotelephone station identification.

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(f) VHF public coast stations licensed to serve a predetermined geographic service area are not required to provide station identification under this section. A site-based VHF public coast station may identify by means of the approximate geographic location of the station or the area it serves when it is the only VHF public coast station serving the location or there will be no conflict with the identification of any other station.

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7. Section 80.142 is amended by removing paragraph (c)(1)(i) and redesignating paragraphs (c)(1)(ii) and (c)(1)(iii) as (c)(1)(i) and (c)(1)(ii).

8. Section 80.203 is amended by adding a new paragraph (m)(6) to read as follows:

§ 80.203 Authorization of transmitters for licensing.

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(m) * * *

(6) No ship station shall include any device or provision capable of transmitting any tone or signal on a distress frequency for any purpose unless specific provisions exist in this Part authorizing such tone or signal.

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9. Section 80.207 is amended by revising paragraph (d) to read as follows:

§ 80.207 Classes of emission.

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(d) The authorized classes of emission are as follows:

Types of stations	Classes of emission
Ship Stations¹	
Radiotelegraphy:	
100-160 kHz.....	A1A
405-525 kHz.....	A1A, J2A
1605-27500 kHz:	
Manual ^{15, 16, 17}	A1A, J2A, J2B, J2D
DSC ⁶	F1B, J2B
NB-DP ^{14, 16}	F1B, J2B, J2D
Facsimile.....	F1C, F3C, J2C, J3C
156-162 MHz ²	F1B, F2B, F2C, F3C, F1D, F2D
DSC.....	G2B
216-220 MHz ³	F1B, F2B, F2C, F3C
1626.5-1646.5 MHz.....	(⁴)
Radiotelephony:	
1605-27500 kHz ^{5, 16}	H3E, J2D, J3E, R3E
27.5-470 MHz ⁶	G3D, G3E
1626.5-1646.5 MHz.....	(⁴)
Radiodetermination:	
285-325 kHz ⁷	A1A, A2A
405-525 kHz (Direction Finding) ⁸	A3N, H3N, J3N, NON
154-459 MHz: ¹²	A1D, A2D, F1D, F2D, G1D, G2D
2.4-9.5 GHz.....	PON
14.00-14.05 GHz.....	F3N
Land Stations¹	
Radiotelegraphy:	
100-160 kHz.....	A1A
405-525 kHz.....	A1A, J2A
1605-2850 kHz:	
Manual.....	A1A, J2A
Facsimile.....	F1C, F3C, J2C, J3C
Alaska-Fixed.....	A1A, J2A
4000-27500 kHz:	
Manual ¹⁶	A1A, J2A, J2B, J2D
DSC ¹⁸	F1B, J2B
NB-DP ^{14, 18}	F1B, J2B, J2D
Facsimile.....	F1C, F3C, J2C, J3C
Alaska-Fixed ^{17, 18}	A1A, A2A, F1B, F2B, J2B, J2D
72-76 MHz.....	A1A, A2A, F1B, F2B
156-162 MHz ^{2, 20}	F1B, F2B, F2C, F3C, F1D, F2D
DSC.....	G2B
216-220 MHz ³	F1B, F2B, F2C, F3C

Radiotelephony:	
1605-27500 kHz ^{18, 19}	H3E, J3E, R3E
72-76 MHz.....	A3E, F3E, G3E
156-470 MHz.....	G3E
Radiodetermination:	
2.4-9.6 GHz.....	PON
Distress, Urgency and Safety ^{8, 9}	
2182 kHz ^{10, 11}	A2B, A3B, H2B, H3E, J2B, J3E
121.500 MHz.....	A3E, A3X, N0N
123.100 MHz.....	A3E
156.750 and 156.800 MHz ¹³	G3E, G3N
243.000 MHz.....	A3E, A3X, N0N
406.025 MHz.....	G1D

¹ Excludes distress, EPIRBs, survival craft, and automatic link establishment.

² Frequencies used for public correspondence and in Alaska 156.425 MHz. *See* §§ 80.371(c), 80.373(f) and 80.385(b). Transmitters approved before January 1, 1994, for G3E emissions will be authorized indefinitely for F2C, F3C, F1D and F2D emissions. Transmitters approved on or after January 1, 1994, will be authorized for F2C, F3C, F1D or F2D emissions only if they are approved specifically for each emission designator.

³ Frequencies used in the Automated Maritime Telecommunications System (AMTS). *See* § 80.385(b).

⁴ Types of emission are determined by the INMARSAT Organization.

⁵ Transmitters approved prior to December 31, 1969, for emission H3E, J3E, and R3E and an authorized bandwidth of 3.5 kHz may continue to be operated. These transmitters will not be authorized in new installations.

⁶ G3D emission must be used only by one-board stations for maneuvering or navigation.

⁷ Frequencies used for cable repair operations. *See* § 80.375(b).

⁸ For direction finding requirements see § 80.375.

⁹ Includes distress emissions used by ship, coast, EPIRBs and survival craft stations.

¹⁰ On 2182 kHz A1B, A2B, H2B and J2B emissions indicate transmission of the auto alarm signals.

¹¹ Ships on domestic voyages must use J3E emission only.

¹² For frequencies 154.585 MHz, 159.480 MHz, 160.725 MHz, 160.785 MHz, 454.000 MHz and 459.000 MHz, authorized for offshore radiolocation and related telecommand operations.

¹³ Class C EPIRB stations may not be used after February 1, 1999.

¹⁴ NB-DP operations which are not in accordance with CCIR Recommendation 625 or 476 are permitted to utilize any modulation, so long as emissions are within the limits set forth in § 80.211(f).

¹⁵ J2B is permitted only on 2000-27500 kHz.

¹⁶ J2D is permitted only on 2000-27500 kHz, and ship stations employing J2D emissions shall at no time use a peak envelope power in excess of 1.5 kW per channel.

¹⁷ J2B and J2D are permitted provided they do not cause harmful interference to A1A.

¹⁸ Coast stations employing J2D emissions shall at no time use a peak envelope power in excess of 10 kW per channel.

¹⁹ J2D is permitted only on 2000-27500 kHz.

²⁰ If a station uses another type of digital emission, it must comply with the emission mask requirements of § 90.210, except that Automatic Identification System (AIS) transmissions do not have to comply with the emission mask requirements of § 90.210.

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10. Section 80.213 is amended by revising paragraph (d) to read as follows:

§ 80.213 Modulation requirements.

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(d) Ship and coast station transmitters operating in the 156-162 MHz and 216-220 bands must be capable of proper operation with a frequency deviation that does not exceed +/- 5 kHz when using any emission authorized by 80.207.

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11. Section 80.215 is amended by revising paragraph (g) to read as follows:

§ 80.215 Transmitter power.

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(g) The carrier power of ship station radiotelephone transmitters, except portable transmitters, operating in the 156-162 MHz band must be at least 8 but not more than 25 watts. Transmitters that use 12 volt lead acid storage batteries as a primary power source must be measured with a primary voltage between 12.2 and 13.7 volts DC. Additionally, unless otherwise indicated, equipment in radiotelephone ship stations operating in the 156-162 MHz band must meet the following requirements:

(1) All transmitters and remote control units must be capable of reducing the carrier power to one watt or less;

(2) Except as indicated in (4) of this paragraph, all transmitters manufactured after January 21, 1987, or in use after January 21, 1997, must automatically reduce the carrier power to one watt or less when the transmitter is tuned to 156.375 MHz or 156.650 MHz, and must be provided with a manual override switch which when held by an operator will permit full carrier power operation on 156.375 MHz and 156.650 MHz;

(3) Except as indicated in (4) of this paragraph, all ship station transmitters installed after [one year after the effective date of these rules] must be capable of tuning to 156.775 MHz and 156.825 MHz and must automatically reduce the carrier power to one watt or less, with no manual override capability, when the transmitter is tuned to either 156.775 MHz or 156.825 MHz;

(4) Hand-held portable transmitters are not required to comply with the automatic reduction of carrier power in (g)(2) of this section; and

(5) Transmitters dedicated for use on public correspondence duplex channels as additional equipment to a VHF ship station in the Great Lakes which meet all pertinent rules in this part are not required to reduce their carrier power to one watt.

* * * * *

12. Section 80.275 is added to read as follows:

§ 80.275 Technical Requirements for Automatic Identification Systems (AIS) equipment.

(a) Prior to submitting a certification application for an AIS device, the following information must be submitted in duplicate to the Commandant (G-MSE), U.S. Coast Guard, 2100 2nd Street, S.W., Washington D.C. 20593-0001:

(1) The name of the manufacturer or grantee and the model number of the AIS device;

(2) Copies of the test report and test data obtained from the test facility showing that the device complies with the environmental and operational requirements identified in Section 80.1101 of this Part.

(b) After reviewing the information described in paragraph (a) of this section, the U.S. Coast Guard will issue a letter stating whether the AIS device satisfies all of the requirements specified in Section 80.1101 of this Part.

(c) A certification application for an AIS device submitted to the Commission must contain a copy of the U.S. Coast Guard letter stating that the device satisfies all of the requirements specified in Section 80.1101 of this Part, a copy of the technical test data, and the instruction manual(s).

13. Section 80.301 is amended by removing paragraph (a) and redesignating paragraphs (b) through (d) as paragraphs (a) through (c).

14. Section 80.302 is amended by revising paragraph (a) to read as follows:

§ 80.302 Notice of discontinuance, reduction, or impairment of service involving a distress watch.

(a) When changes occur in the operation of a public coast station which include discontinuance, relocation, reduction or suspension of a watch required to be maintained on 2182 kHz or 156.800 MHz, notification must be made by the licensee to the nearest district office of the U.S. Coast Guard as soon as practicable. The notification must include the estimated or known resumption time of the watch.

* * * * *

15. Section 80.304 is amended by removing paragraph (a) and retaining paragraph (b) as an undesignated paragraph.

16. Section 80.305 is amended by removing paragraph (a)(1) and redesignating paragraphs (a)(2) and (a)(3) as paragraphs (a)(1) and (a)(2).

17. Section 80.306 is removed.

18. Section 80.319 is amended by revising paragraph (c) to read as follows:

§ 80.319 Radiotelegraph distress call and message transmission procedure.

* * *

(c) The distress message, preceded by the distress call, must be repeated at intervals until an answer is received. The radiotelegraph alarm signal may also be repeated, if necessary.

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19. Section 80.329 is amended by revising paragraph (d) to read as follows:

§ 80.329 Safety signals.

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(d) The safety signal and call must be sent on one of the international distress frequencies (2182 kHz or 156.8 MHz radiotelephone). Stations which cannot transmit on a distress frequency may use any other available frequency on which attention might be attracted.

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20. Section 80.330 is amended by removing paragraph (b) and redesignating paragraphs (c) and (d) as paragraphs (b) and (c).

21. Section 80.355 is amended by removing paragraph (b) and redesignating paragraphs (c) and (d) as paragraphs (b) and (c).

22. Section 80.357 is amended by removing paragraph (b)(2)(iv).

23. Section 80.371 is amended by revising paragraphs (c)(1)(ii) and (c)(1)(iii) to read as follows:

§ 80.371 Public correspondence frequencies.

* * * * *

(c) * * *

(1) * * * * *

(ii) Service areas in the marine VHF 156-162 MHz band are VHF Public Coast Station Areas (VPCSAs). As listed in the table in this paragraph, VPCSAs are based on, and composed of one or more of, the U.S. Department of Commerce's 172 Economic Areas (EAs). *See* 60 FR 13114 (March 10, 1995). In addition, the Commission shall treat Guam and the Northern Mariana Islands, Puerto Rico and the United States Virgin Islands, American Samoa, and the Gulf of Mexico as EA-like areas, and has assigned them EA numbers 173-176, respectively. Maps of the EAs and VPCSAs are available for public inspection and copying at the FCC Public Reference Room, Room CY-A257, 445 12th Street, S.W., Washington, D.C. 20554. Except as shown in the table, the frequency pairs listed in paragraph (c)(1)(i) of this section are available for assignment to a single licensee in each of the VPCSAs listed in the table in this paragraph. In addition to the EAs listed in the table in this paragraph, each VPCSA also includes the adjacent waters under the jurisdiction of the United States. * * *

(iii) Subject to paragraph (c)(3) of this section, each licensee may also operate on 12.5 kHz offset frequencies in areas where the licensee is authorized on both frequencies adjacent to the offset frequency, and in areas where the licensee on the other side of the offset frequency consents to the licensee's use of the adjacent offset frequency. Coordination with Canada is required for offset operations under any circumstance in which operations on either adjoining 25 kHz channel would require such coordination. *See* § 80.57 of this part.

* * * * *

24. Section 80.373 is amended by revising paragraph (f) to read as follows:

§ 80.373 Private communications frequencies.

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(f) Frequencies in the 156-162 MHz band. The following tables describe the carrier frequencies available in the 156-162 MHz band for radiotelephone communications between ship and private coast stations. (Note: the letter "A" following the channel designator indicates simplex operation on a channel designated internationally as a duplex channel.)

Frequencies in the 156-162 MHz band

Channel designator	Carrier frequency (MHz) Ship transmit	Carrier frequency (MHz) Coast transmit	Points of communication (Intership and between Coast and ship unless otherwise indicated)
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Port Operations

01A ¹	156.050	156.050	
63A ¹	156.175	156.175	
05A ²	156.250	156.250	
65A	156.275	156.275	
66A	156.325	156.325	
12 ³	156.600	156.600	
73	156.675	156.675	
14 ³	156.700	156.700	
74	156.725	156.725	
75 ¹⁸	156.775	156.775	
76 ¹⁸	156.825	156.825	
77 ⁴	156.875	.....
20A ¹²	157.000	.....
			Intership only. Intership only.

Navigational (Bridge-to-Bridge)⁵

13 ⁶	156.650	156.650	
67 ⁷	156.375	156.375	

Commercial

01A ¹	156.050	156.050	Intership only. Do.
63A ¹	156.175	156.175	
07A	156.350	156.350	
67 ⁷	156.375	.....
08	156.400	.....
09	156.450	156.450	
10	156.500	156.500	
11 ³	156.550	156.550	
18A	156.900	156.900	
19A	156.950	156.950	
79A	156.975	156.975	
80A	157.025	157.025	
88A ⁸	157.425	.....
72 ¹⁴	156.625	Intership only. Intership only.

Digital Selective Calling

70 ¹⁵	156.525	156.525	
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Noncommercial

68 ¹⁷	156.425	156.425	Intership only. Great Lakes only.
09 ¹⁶	156.450	156.450	
69	156.475	156.475	
71	156.575	156.575	
72	156.625	.....
78A	156.925	156.925	
79A	156.975	156.975	

80A	157.025	157.025	Do.
67 ¹⁴	156.375	.....	Intership only.
Distress, Safety and Calling			
16	156.800	156.800	
Intership Safety			
06	156.300	.....	a. Intership, or b. For SAR: Ship and aircraft for the U.S. Coast Guard.
Environmental			
15 ¹³ .....	.....	156.750	Coast to ship only.
Maritime Control			
17 ^{9, 10}	156.850	156.850	
Liaison and Safety Broadcasts, U.S. Coast Guard			
22A ¹¹	157.100	157.100	Ship, aircraft, and coast stations of the U.S. Coast Guard and at Lake Mead, Nev., ship and coast stations of the National Park Service, U.S. Department of the Interior.

¹ 156.050 MHz and 156.175 MHz are available for port operations and commercial communications purposes when used only within the U.S. Coast Guard designated Vessel Traffic Services (VTS) area of New Orleans, on the lower Mississippi River from the various pass entrances in the Gulf of Mexico to Devil's Swamp Light at River Mile 242.4 above head of passes near Baton Rouge.

² 156.250 MHz is available for port operations communications use only within the U.S. Coast Guard designated VTS radio protection areas of New Orleans and Houston described in § 80.383. 156.250 MHz is available for intership port operations communications used only within the area of Los Angeles and Long Beach harbors, within a 25-nautical mile radius of Point Fermin, California.

³ 156.550 MHz, 156.600 MHz and 156.700 MHz are available in the U.S. Coast Guard designated port areas only for VTS communications and in the Great Lakes available primarily for communications relating to the movement of ships in sectors designated by the St. Lawrence Seaway Development Corporation or the U.S. Coast Guard. The use of these frequencies outside VTS and ship movement sector protected areas is permitted provided they cause no interference to VTS and ship movement communications in their respective designated sectors.

⁴ Use of 156.875 MHz is limited to communications with pilots regarding the movement and docking of ships. Normal output power must not exceed 1 watt.

⁵ 156.375 MHz and 156.650 MHz are available primarily for intership navigational communications. These frequencies are available between coast and ship on a secondary basis when used on or in the vicinity of locks or drawbridges. Normal output power must not exceed 1 watt. Maximum output power must not exceed 10 watts for coast stations or 25 watts for ship stations.

⁶ On the Great Lakes, in addition to bridge-to-bridge communications, 156.650 MHz is available for vessel control purposes in established vessel traffic systems. 156.650 MHz is not available for use in the Mississippi River from South Pass Lighted Whistle Buoy "2" and Southwest Pass entrance Mid-channel Lighted Whistle Buoy to mile 242.4 above Head of Passes near Baton Rouge. Additionally it is not available for use in the Mississippi River-Gulf Outlet, the Mississippi River-Gulf Outlet Canal, and the Inner Harbor Navigational Canal, except to aid the transition from these areas.

⁷ Use of 156.375 MHz is available for navigational communications only in the Mississippi River from South Pass Lighted Whistle Buoy "2" and Southwest Pass entrance Mid-channel Lighted Whistle Buoy to mile 242.4 above Head of Passes near Baton Rouge, and in addition over the full length of the Mississippi River-Gulf Outlet Canal from entrance to its junction with the Inner Harbor Navigational Canal, and over the full length of the Inner Harbor Navigational Canal from its junction with the Mississippi River to its entry to Lake Pontchartrain at the New Seabrook vehicular bridge.

⁸ Within 120 km (75 miles) of the United States/Canada border, in the area of the Puget Sound and the Strait of Juan de Fuca and its approaches, 157.425 MHz is half of the duplex pair designated as Channel 88. In this area, Channel 88 is available to ship stations for communications with public coast stations only. More than 120 km (75 miles) from the United States/Canada border, in the area of the Puget Sound and the Strait of Juan de Fuca, its approaches, the Great Lakes, and the St. Lawrence Seaway, 157.425 MHz is available for intership and commercial communications. Outside Puget Sound area and its approaches and the Great Lakes, 157.425 MHz is also available for communications between commercial fishing vessels and associated aircraft while engaged in commercial fishing activities.

⁹ When the frequency 156.850 MHz is authorized, it may be used additionally for search and rescue training exercises conducted by state or local governments.

¹⁰ The frequency 156.850 MHz is additionally available to coast stations on the Great Lakes for transmission of scheduled Coded Marine Weather Forecasts (MAFOR), Great Lakes Weather Broadcast (LAWEB) and unscheduled Notices to Mariners or Bulletins. F3C and J3C emissions are permitted. Coast stations on the Great Lakes must cease weather broadcasts which cause interference to stations operating on 156.800 MHz until the interference problem is resolved.

¹¹ The frequency 157.100 MHz is authorized for search and rescue training exercises by state or local government in conjunction with U.S. Coast Guard stations. Prior U.S. Coast Guard approval is required. Use must cease immediately on U.S. Coast Guard request.

¹² The duplex pair for channel 20 (157.000/161.600 MHz) may be used for ship to coast station communications.

¹³ Available for assignment to coast stations, the use of which is in accord with an agreed program, for the broadcast of information to ship stations concerning the environmental conditions in which vessels operate, i.e., weather; sea conditions; time signals; notices to mariners; and hazards to navigation.

¹⁴ Available only in the Puget Sound and the Strait of Juan de Fuca.

¹⁵ The frequency 156.525 MHz is to be used exclusively for distress, safety and calling using digital selective calling techniques. No other uses are permitted.

¹⁶ The frequency 156.450 MHz is available for intership, ship and coast general purpose calling by noncommercial vessels, such as recreational boats and private coast stations.

¹⁷ The frequency 156.425 MHz is assigned by rule to private coast stations in Alaska for facsimile transmissions as well as voice communications.

¹⁸ The frequencies 156.775 and 156.825 MHz are available for navigation-related port operations or ship movement only, and all precautions must be taken to avoid harmful interference to channel 16. Transmitter output power is limited to 1 watt for ship stations, and 10 watts for coast stations.

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25. Section 80.405 is amended by redesignating paragraph (c) as (c)(1) and adding new paragraph (c)(2) to read as follows:

§ 80.405 Station license.

* * * * *

(c) Posting.

(1) The current station authorization for a station other than a public coast station, or a clearly legible copy, must be posted at the principal control point of each station. If a copy is posted, it must indicate the location of the original. When the station license cannot be posted as in the case of a marine utility station operating at temporary unspecified locations or the ship or recreational boat does not have an enclosed wheelhouse, it must be kept where it will be readily available for inspection. The licensee of a station on board a ship subject to Part II or III or Title III of the Communications Act or the Safety Convention must retain the most recently expired ship station license in the station records until the first Commission inspection after the expiration date.

(2) Public coast stations authorized under this part must make available either a clearly legible copy of the authorization for each station at the principal control point of the station or an address or location where the current authorization may be found and a telephone number of that authorization's representative.

* * * * *

26. Section 80.409 is amended by revising paragraphs (b)(2) and (c) to read as follows, and by removing paragraphs (d)(4), (d)(5), and (d)(11), and redesignating paragraphs (d)(6) through (d)(10) as paragraphs (d)(4) through (d)(8).

§ 80.409 Station logs.

* * * * *

(b) * * *

(2) Logs containing entries required by paragraph (c) of this section must be kept either at the principal control point of the station or electronically filed at the station licensee's primary office or available to the Commission via secured access to the licensee's Internet web site. Logs containing entries required by paragraphs (e) and (f) of this section must be kept at the principal radiotelephone operating location while the vessel is being navigated. All entries in their original form must be retained on board the vessel for at least 30 days from the date of entry. Additionally, logs required by paragraph (f) of this section must be retained on board the vessel for a period of 2 years from the date of the last inspection of the ship radio station.

(c) *Public coast station logs.* Public coast stations must maintain a log, whether by means of written or automatic logging or a combination thereof. The log must contain the following information:

1) "ON DUTY" must be entered by the operator beginning a duty period, followed in the case of a written log by the operator's signature. "OFF DUTY" must be entered by the operator being relieved of or terminating duty, followed in the case of a written log by the operator's signature.

(2) The date and time of making an entry must be shown opposite the entry.

(3) Failure of equipment to operate as required and incidents tending to unduly delay communication must be entered.

(4) All measurements of the transmitter frequency(ies) must be entered with a statement of any corrective action taken.

(5) Entries must be made giving details of all work performed which may affect the proper operation of the station. The entry must be made, dated and in the case of a written log signed by the operator who supervised or performed the work and, unless the operator is regularly employed on a full-time basis at the station, must also include the mailing address, class, serial number, and expiration date of the operator license.

(6) Entries must be made about the operation of the antenna tower lights when the radio station has an antenna structure requiring illumination by part 17 of this chapter.

(7) All distress or safety related calls transmitted or received must be entered, together with the frequency used and the position of any vessel in need of assistance.

* * * * *

27. Section 80.471 is amended to read as follows:

§ 80.471 Discontinuance or impairment of service.

Except as specified in § 20.15(b)(3) of this chapter with respect to commercial mobile radio service providers, a public coast station must not discontinue or impair service unless authorized to do so by the Commission.

* * * * *

28. Section 80.905 is amended by revising paragraph (a) to read as follows:

§ 80.905 Vessel radio equipment.

(a) Vessels subject to Part III of Title III of the Communications Act that operate in the waters described in §80.901 must, at a minimum, be equipped as follows:

(1) Vessels operated solely within the communications range of a VHF public coast station or U.S. Coast Guard station that maintains a watch on 156.800 MHz while the vessel is navigated must be equipped with a VHF-DSC radiotelephone installation, except that a VHF radiotelephone installation without DSC capability is permitted until one year after the Coast Guard notifies the Commission that shore-based sea area A1 coverage is established. Vessels in this category must not operate more than 20 nautical miles from land.

(2) Vessels operated beyond the 20 nautical mile limitation specified in paragraph (a)(1) of this section, but not more than 100 nautical miles from the nearest land, must be equipped with a MF-DSC frequency transmitter capable of transmitting J3E emission and a receiver capable of reception of J3E emission within the band 1710 to 2850 kHz, in addition to the VHF-DSC radiotelephone installation required by paragraph (a)(1) of this section, except that a MF radiotelephone installation without DSC capability is permitted until one year after the Coast Guard notifies the Commission that shore-based sea area A2 coverage is established. The MF or MF-DSC transmitter and receiver must be capable of operation on 2670 kHz.

(3) Vessels operated more than 100 nautical miles but not more than 200 nautical miles from the nearest land must:

(i) Be equipped with a VHF-DSC radiotelephone installation, except that a VHF radiotelephone installation without DSC capability is permitted until one year after the Coast Guard notifies the Commission that shore-based sea area A1 coverage is established;

(ii) Be equipped with an MF-DSC radiotelephone transmitter and receiver meeting the requirements of paragraph (a)(2) of this section, except that a MF radiotelephone installation without DSC capability is permitted until one year after the Coast Guard notifies the Commission that shore-based sea area A2 coverage is established; and

(iii) Be equipped with either:

(A) A DSC-capable single sideband radiotelephone that complies with ITU-R Rec. (series) M.493 Class A, B or E, and is capable of operating on all distress and safety frequencies in the medium frequency and high frequency bands listed in §80.369(a) and (b), on all of the ship-to-shore calling frequencies in the high frequency bands listed in §80.369(d), and on at least four of the automated mutual-assistance vessel rescue (AMVER) system HF duplex channels (this requirement may be met by the addition of such frequencies to the radiotelephone installation required by paragraph (a)(2) of this section); or

(B) If operated in an area within the coverage of an INMARSAT maritime mobile geostationary satellite in which continuous alerting is available, an INMARSAT B, C, or M ship earth station, or an INMARSAT A ship earth station if installed prior to February 12, 2004.

(iv) Be equipped with a reserve power supply meeting the requirements of §§ 80.917(b), 80.919 and 80.921, and capable of powering the single sideband radiotelephone or the ship earth station (including associated peripheral equipment) required by paragraph (a)(3)(iii) of this section, including the navigation receiver referred to in § 80.905(a)(5);

(v) Be equipped with a NAVTEX receiver conforming to the following performance standards: IMO Resolution A.525(13) and ITU-R Recommendation 540;

(vi) Be equipped with a Category I 406-406.1 MHz satellite emergency position-indicating radiobeacon (EPIRB) meeting the requirements of § 80.1061 or, if the ship is not operating in sea area A4, as defined in § 80.1069(a)(4) of this part, an automatic float-free INMARSAT-E EPIRB meeting the requirements of § 80.1063; and

(vii) Participate in the AMVER system while engaged on any voyage where the vessel is navigated in the open sea for more than 24 hours. Copies of the AMVER Bulletin are available at: AMVER Maritime Relations, USCG Battery Park Building, Room 201, New York, NY 10004-1499. Phone 212-668-7764; Fax 212-668-7684.

(4) Vessels operated more than 200 nautical miles from the nearest land must:

(i) Be equipped with two VHF-DSC radiotelephone installations, except that VHF radiotelephone installations without DSC capability are permitted until one year after the Coast Guard notifies the Commission that shore-based sea area A1 coverage is established;

(ii) Be equipped with an MF-DSC radiotelephone transmitter and receiver meeting the requirements of paragraph (a)(2) of this section, except that a MF radiotelephone installation without DSC capability is permitted until one year after the Coast Guard notifies the Commission that shore-based sea area A2 coverage is established;

(iii) Be equipped with either:

(A) A DSC-capable independent single sideband radiotelephone that complies with ITU-R Rec. (series) M.493 Class A, B or E, and is capable of operating on all distress and safety frequencies in the medium frequency and high frequency bands listed in §80.369(a) and (b), on all of the ship-to-shore calling frequencies in the high frequency bands listed in §80.369(d), and on at least four of the automated mutual-assistance vessel rescue (AMVER) system HF duplex channels; or

(B) If operated in an area within the coverage of an INMARSAT maritime mobile geostationary satellite in which continuous alerting is available, an INMARSAT B, C, or M ship earth station, or an INMARSAT A ship earth station if installed prior to February 12, 2004.

(iv) Be equipped with a reserve power supply meeting the requirements of §§80.917(b), 80.919 and 80.921, and capable of powering the single sideband radiotelephone or the ship earth station (including associated peripheral equipment) required by paragraph (a)(4)(iii) of this section, including the navigation receiver referred to in § 80.905(a)(5);

(v) Be equipped with a NAVTEX receiver conforming to the following performance standards: IMO Resolution A.525(13) and ITU-R Recommendation 540;

(vi) Be equipped with a Category I 406-406.1 MHz satellite emergency position-indicating radiobeacon (EPIRB) meeting the requirements of § 80.1061 or, if the ship is not operating in sea area A4, as defined in § 80.1069(a)(4) of this part, an automatic float-free INMARSAT-E EPIRB meeting the requirements of § 80.1063;

(vii) Be equipped with a radiotelephone distress frequency watch receiver meeting the requirements of § 80.269;

(viii) Be equipped with an automatic radiotelephone alarm signal generator meeting the requirements of § 80.221; and

(ix) Participate in the AMVER system while engaged on any voyage where the vessel is navigated in the open sea for more than 24 hours. Copies of the AMVER Bulletin are available at: AMVER Maritime Relations, USCG Battery Park Building, Room 201, New York, NY 10004-1499. Phone 212-668-7764; Fax 212-668-7684.

(5) Vessels must comply with the requirements for a navigation receiver or manual updating of position information contained in § 80.1085(c) of this part.

* * * * *

29. Section 80.1061 is amended by revising paragraphs (e) and (f) to read as follows:

§ 80.1061 Special requirements for 406.0-406.1 MHz EPIRB stations.

* * * * *

(e) An identification code, issued by the National Oceanic and Atmospheric Administration (NOAA), the United States Program Manager for the 406.025 MHz COSPAS/SARSAT satellite system, must be programmed in each EPIRB unit to establish a unique identification for each EPIRB station. With each marketable EPIRB unit, the manufacturer or grantee must include a postage pre-paid registration card printed with the EPIRB identification code addressed to: NOAA/SARSAT Beacon Registration, E/SP3, Federal Building 4, Room 3320, 5200 Auth Road, Suitland, MD 20746-4304. The registration card must request the owner's name, address, telephone number, type of ship, alternate emergency contact and other information as required by NOAA. The registration card must also contain information regarding the availability to register the EPIRB at NOAA's online web-based registration database at: <http://www/beaconregistration.noaa.gov>. In addition, the following statement must be included: "WARNING -- failure to register this EPIRB with NOAA before installation could result in a monetary forfeiture being issued to the owner."

(f) To enhance protection of life and property it is mandatory that each 406.0-406.1 MHz EPIRB be registered with NOAA before installation and that information be kept up-to-date. Therefore, in addition to the identification plate or label requirements contained in §§ 2.925 and 2.926 of this chapter, each 406.0-406.1 MHz EPIRB must be provided on the outside with a clearly discernible permanent plate or label containing the following statement: "The owner of this 406.0-406.1 MHz EPIRB must register the NOAA identification code contained on this label with the National Oceanic and Atmospheric Administration (NOAA) whose address is: NOAA, NOAA/SARSAT Beacon Registration, E/SP3, Federal Building 4, Room 3320, 5200 Auth Road, Suitland, MD 20746-4304." Vessel owners shall advise NOAA in writing upon change of vessel or EPIRB ownership, transfer of EPIRB to another vessel, or any other change in registration information. NOAA will provide registrants with proof of registration and change of registration postcards.

30. Section 80.1063 is added to read as follows:

§ 80.1063 Special requirements for INMARSAT-E EPIRB stations.

(a) Notwithstanding the provisions in paragraph (b) of this section, INMARSAT-E EPIRBs must meet all the technical and performance standards contained in IEC 61097-5 Ed. 1.0, titled "Global maritime and distress safety system (GMDSS) – Part 5: INMARSAT-E – Emergency position indicating radio beacon (EPIRB) operating through the INMARSAT system – Operational and performance requirements, methods of testing and required test results," including Annex B, 1997. IEC 61097-5 Ed. 1.0, including Annex B, is incorporated by reference. The Director of the Federal Register approves this incorporation by reference in accordance with 5 U.S.C. 552(a) and 1 CFR Part 51. Copies of these standards can be inspected at the Federal Communications Commission, 445 12th Street, SW, Washington, D.C. (Reference Information Center) or at the Office of the Federal Register, 800 North Capitol Street, NW, Suite 700, Washington, D.C. IEC publications can be purchased from the International Electrotechnical Commission, 3 Rue de Varembe, CH-1211 Geneva 20, Switzerland, or from the American National Standards Institute (ANSI), 25 West 43rd Street, New York, NY 10036, telephone (212) 642-4900.

(b) Prior to submitting a certification application for an INMARSAT-E radiobeacon, the radiobeacon must be certified by INMARSAT as complying with IEC 61097-5 Ed. 1.0. In addition, the radiobeacon must be tested as to compliance with the environmental and operational requirements identified in paragraph (b) of this section by the test facility which conducted the INMARSAT certification tests, or a test facility recognized by the U.S. Coast Guard. Information regarding recognized test facilities may be obtained from Commandant (G-MSE), U.S. Coast Guard, 2100 2nd Street, S.W., Washington, D.C. 20593-0001, <http://www.uscg.mil/hq/g-m/mse/lablist/161.011.htm>.

(1) After an INMARSAT-E PIRB has been certified by the test facility, the following information must be submitted in duplicate to the Commandant (G-MSE), U.S. Coast Guard, 2100 2nd Street, S.W., Washington D.C. 20593-0001:

(i) The name of the manufacturer or grantee and the model number of the radiobeacon;

(ii) Copies of the Inmarsat certification of compliance with IEC 61097-5 Ed. 1.0;

(iii) Copies of the test report and test data obtained from the test facility showing that the radiobeacon complies with IEC 61097-5 Ed. 1.0 and the environmental and operational requirements identified in paragraph (b) of this section; and

(iv) Instruction manuals associated with the radiobeacon, description of the test characteristics of the radiobeacon including assembly drawings, electrical schematics, description of parts list, specifications of materials, and the manufacturer's quality assurance program.

(2) After reviewing the information described in paragraph (c)(1) of this section, the U.S. Coast Guard will issue a letter stating whether the radiobeacon satisfies all of the requirements specified in subsections (a) and (b) of this section.

(c) A certification application for an INMARSAT-EPIRB submitted to the Commission must also contain a copy of the U.S. Coast Guard letter stating that the radiobeacon satisfies all of the requirements specified in subsections (a) and (b) of this section, a copy of the technical test data, and the instruction manual(s).

(d) The manufacturer or grantee must include with each marketable INMARSAT-E EPIRB appropriate material for registration of the radiobeacon with INMARSAT, along with a written warning that failure to register the radiobeacon could delay rescue services in an emergency.

(e) To enhance protection of life and property it is mandatory that each INMARSAT-E EPIRB be registered with INMARSAT before installation and that information be kept up-to-date. Therefore, in addition to the identification plate or label requirements contained in §§2.925 and 2.926 of this chapter, each INMARSAT-E EPIRB must be provided on the outside with a clearly discernable permanent plate or label containing the following statement: "The owner of this INMARSAT-E EPIRB must register the NOAA identification code contained on this label with INMARSAT at the following address: INMARSAT, 99 City Road, London, EC1Y 1AX, United Kingdom." Vessel owners shall advise INMARSAT in writing upon change of vessel or EPIRB ownership, transfer of EPIRB to another vessel, or any other change in registration information.

(f) For INMARSAT-E EPIRBs whose identification code can be changed after manufacture, the identification code shown on the plate or label must be easily replaceable using commonly available tools.

* * * * *

31. Section 80.1077 is revised to read as follows:

§ 80.1077 Frequencies.

The following table describes the frequencies used in the Global Maritime Distress and Safety System:

Alerting:

406.0-406.1 EPIRBs.....	406.0-406.1 MHz (Earth-to-space). 1544-1545 MHz (space-to-Earth).
INMARSAT-E EPIRBs.....	1626.5-1645.5 MHz (Earth-to-space).
INMARSAT Ship Earth Stations capable of voice and/or direct printing.....	1626.5-1645.5 MHz (Earth-to-space).
VHF DSC Ch. 70.....	156.525 MHz ¹ .
MF/HF DSC ^{2 11}	2187.5 kHz ³ , 4207.5 kHz, 6312 kHz, 8414.5 kHz, 12577 kHz, and 16804.5 kHz.

* * *

Locating signals:

406-406.1 EPIRB Beacons.....	121.5 MHz.
9 GHz radar transponders.....	9200-9500 MHz

* * *

Maritime safety information (MSI):

International NAVTEX.....	518 kHz ⁷
Warnings.....	490 kHz, 4209.5 kHz
NBDP.....	4210 kHz, 6314 kHz, 8416.5 kHz, 12579 kHz, 16806.5 kHz, 19680.5 kHz, 22376 kHz, 26100.5 kHz
Satellite.....	1530-1545 MHz ¹⁰

* * *

¹ Frequency 156.525 MHz can be used for ship-to-ship alerting and, if within sea area A1, for ship-to-shore alerting.

² For ships equipped with MF/HF equipment, there is a watch requirement on 2187.5 kHz, 8414.5 kHz, and one other frequency.

³ Frequency 2187.5 kHz can be used for ship-to-ship alerting and, if within sea area A2, for ship-to-shore alerting.

* * *

⁷ The international NAVTEX frequency 518 kHz is the primary frequency for receiving maritime safety information. The other frequencies are used only to augment the coverage or information provided on 518 kHz.

⁸ [Reserved.]

⁹ [Reserved.]

¹⁰ In addition to EPIRBs, 1544-1545 MHz can be used for narrowband distress and safety operations and 1645.5-1646.5 MHz can be used for relay of distress alerts between satellites. Feeder links for satellite communications are assigned from the fixed satellite service, see 47 CFR § 2.106.

¹¹ Routine calling is not permitted on MF and HF DSC frequencies.

* * * * *

32. Section 80.1083 is amended by adding paragraphs (d) through (f) to read as follows:

§ 80.1083 Ship radio installations.

* * * * *

(d) In passenger ships, a distress panel shall be installed at the conning position. This panel shall contain either one single button which, when pressed, initiates a distress alert using all radiocommunications installations required on board for that purpose or one button for each individual installation. The panel shall clearly and visually indicate whenever any button or buttons have been pressed. Means shall be provided to prevent inadvertent activation of the button or buttons. If the satellite EPIRB is used as the secondary means of distress alerting and is not remotely activated, it shall be acceptable to have an additional EPIRB installed in the wheelhouse near the conning position.

(e) In passenger ships, information on the ship's position shall be continuously and automatically provided to all relevant radiocommunications equipment to be included in the initial distress alert when the button or buttons on the distress panel is pressed.

(f) In passenger ships, a distress alarm panel shall be installed at the conning position. The distress alarm panel shall provide visual and aural indication of any distress alert or alerts received on board and shall also indicate through which radiocommunication service the distress alerts have been received.

33. Section 80.1085 is amended by revising paragraph (a)(6)(i) and by adding paragraph (d) to read as follows:

§ 80.1085 Ship radio equipment-General.

(a) * * *

(6) * * *

(i) Capable of transmitting a distress alert through the polar orbiting satellite service operating in the 406.0-406.1 MHz band (406.0-406.1 MHz EPIRB) of, if the ship is not operating in sea area A4, as defined in § 80.1069(a)(4) of this part, the 1.6 GHz band (INMARSAT-E EPIRB); and

* * * * *

(d) Every passenger ship shall be provided with means for two-way on-scene radiocommunications for search and rescue purposes using the aeronautical frequencies 121.5 and 123.1 MHz from the position from which the ship is normally navigated.

* * * * *

34. Section 80.1087 is amended by revising paragraph (a)(2) to read as follows:

§ 80.1087 Ship radio equipment—Sea area A1.

(a) * * *

(2) Through the polar orbiting satellite service on 406.0-406.1 MHz or the INMARSAT-E service in the 1.6 GHz band (this requirement may be fulfilled by the EPIRB required by § 80.1085(a)(6) of this part, either by installing the EPIRB close to, or by allowing remote activation from, the position from which the ship is normally navigated); or

* * * * *

35. Section 80.1089 is amended by revising paragraph (a)(3)(i) to read as follows:

§ 80.1089 Ship radio equipment—Sea areas A1 and A2.

(a) * * * * *

(3) Means of initiating the transmission of ship-to-shore distress alerts by a radio service other than MF operating either:

(i) Through the polar orbiting satellite service on 406.0-406.1 MHz or the INMARSAT-E service in the 1.6 GHz band (this requirement may be fulfilled by the EPIRB required by § 80.1085(a)(6) of this part, either by installing the EPIRB close to, or by allowing remote activation from, the position from which the ship is normally navigated); or

* * * * *

36. Section 80.1091 is amended by revising paragraph (a)(4)(i), redesignating paragraph (b)(3)(ii) as (b)(3)(iii), and adding a new paragraph (b)(3)(ii) to read as follows:

§ 80.1091 Ship radio equipment – Sea areas A1, A2, and A3.

* * * * *

(a) * * * * *

(4) * * * * *

(i) Through the polar orbiting satellite service on 406.0-406.1 MHz or the INMARSAT-E service in the 1.6 GHz band (this requirement may be fulfilled by the EPIRB required by § 80.1085(a)(6) of this part, either by installing the EPIRB close to, or by allowing remote activation from, the position from which the ship is normally navigated); or

* * * * *

(b) * * * * *

(3) * * * * *

(ii) Through the INMARSAT-E service in the 1.6 GHz band (this requirement may be fulfilled by the EPIRB required by § 80.1085(a)(6) of this part, either by installing the EPIRB close to, or by allowing remote activation from, the position from which the ship is normally navigated); or

* * * * *

37. Section 80.1093 is amended by revising paragraph (a) to read as follows:

§ 80.1093 Ship radio equipment – Sea areas A1, A2, A3, and A4.

* * *

(a) In addition to meeting the requirements of § 80.1085 of this part, ships engaged on voyages in all sea areas must be provided with the radio installations and equipment required by § 80.1091(b), except that the equipment required by § 80.1091(b)(3)(ii) and § 80.1091(b)(3)(iii) cannot be accepted as an alternative to that required by § 80.1091(b)(3)(i), which must always be provided.

38. Section 80.1101 is amended by redesignating paragraph (c)(11) as (c)(13) and adding new paragraphs (c)(11) and (c)(12) to read as follows:

§ 80.1101 Performance standards.

* * * * *

(c) * * * * *

(11) *INMARSAT-E EPIRBs*: (i) IMO Resolution A.812(19), "Performance Standards for Float-Free Satellite EPIRBs Operating Through the Geostationary INMARSAT Satellite System on 1.6 GHz," adopted 23 November 1995.

(ii) IMO Resolution A.662(16), "Performance Standards for Float-Free Release and Activation Arrangements for Emergency Radio Equipment," adopted 19 October 1989.

(iii) Recommendation ITU-R M.632-3, "Transmission Characteristics of a Satellite Emergency Indicating Radio Beacon (Satellite EPIRB) System Operating Through Geostationary Satellites in the 1.6 GHz Band," 1997.

(iv) IEC 61097-5, "Global maritime distress and safety system (GMDSS) – Part 5: Inmarsat-E Emergency position indicating radio beacon (EPIRB) operating through the Inmarsat system – operational and performance requirements, methods of testing and required test results," including Annex B.

(v) The INMARSAT E-EPIRBs must also comply with § 80.1063.

(12) *Automatic Identification Systems (AIS)*: (i) ITU-R M.1371-1, "Technical characteristics for a universal shipborne automatic identification system using time division multiple access in the VHF maritime mobile band," with Annexes, August 2001.

(ii) IMO Resolution MSC.74(69), "Adoption of new and amended performance standards, Annex 3 Recommendation on Performance Standards for Universal Shipborne Automatic Identification Systems (AIS)," adopted 12 May 1998.

(iii) IEC 61162-1, "Maritime navigation and radiocommunication equipment and systems – Digital interfaces – Part 1: Single talker and multiple listeners."

(iv) IEC 61162-100, "Maritime navigation and radiocommunication equipment and systems - Digital interfaces – Part 100: Single talker and multiple listeners - Extra requirements to IEC 61162-1 for the UAIS."

(v) IEC 61993-2, "Maritime navigation and radiocommunication equipment and systems - Automatic identification systems (AIS) – Part 2: Class A shipborne equipment of the universal automatic identification system (AIS) – Operational and performance requirements, methods of test and required test results," with Annexes.

* * * * *

39. Section 80.1103 is amended by revising paragraphs (b) and (c) to read as follows:

§ 80.1103 Equipment authorization.

* * * * *

(b) Applicants for certification must submit with their applications measurement data sufficiently complete to ensure compliance with the technical parameters. The application must include the items listed in 47 CFR § 2.1033. Additional measurement data or information may be requested depending upon the equipment. For items not listed in § 2.1033 of this chapter, the applicant must attest that the equipment complies with performance standards as specified in § 80.1101 and, where applicable, that measurements have been made that demonstrate the necessary compliance. Submission of representative data demonstrating compliance is not required unless requested by the Commission.

(c) Applicants for verification must attest that the equipment complies with performance standards as specified in §80.1101 and, where applicable, that measurements have been made that demonstrate the necessary compliance. Submission of representative data demonstrating compliance is not required unless requested by the Commission. An application must include the items listed in §§ 2.953 and 2.955 of this chapter and a copy of the INMARSAT type-approval certification indicating that equipment meets GMDSS standards and includes all peripheral equipment associated with the specific unit under review.

* * * * *